

6944 *Cedionychis 6-maculata*, Ill.

Found this species abundant on one occasion while sweeping with a net in a weedy swamp, July 8. Could not determine what plant.

7070 *Microrhopala porcata*, *Mels.* One specimen taken while beating.

8677 *Orchestes niger*, *Horn.* Swept from weeds in June, three years in succession. Never found it prior to 1890. W. H. Harrington mentions this species among those found at Ottawa.

8956 *Euchætes echidna*, *Lec.* Rare, one found on elm. This specimen is in Mr. Reinecke's collection.

9213 *Eusphyrus Walshii*, *Lec.* Not rare, found on dead basswood.

### A VERY REMARKABLE AND ANOMALOUS SYRPHID, WITH PECULIARLY DEVELOPED HIND TARSI.

BY C. H. TYLER TOWNSEND.

In a lot of flies sent me from Illinois, by Professor S. A. Forbes, I find a most remarkable species, which I am satisfied must be located in the *Syrphidae*, though the wing shows no sign of the spurious vein, and the first posterior cell is open. The third antennal joint bears a terminal arista, which character is shared by only two previously known North American genera; but the remarkable character of the fly lies in its hind tarsi. These are most abnormally developed, probably only in the ♂ sex, and might well be taken for monstrosities, did they not fully correspond with each other. I regard this as a secondary sexual character.

This syrphid will probably demand the erection of a separate tribe for its reception, its venation being radically different from both *Pellococera* and *Ceria*, the two genera above referred to as possessing a terminal arista. The wing and hind tarsus are figured in outline, merely to give a more correct idea of the characters of this peculiar fly. On account of its elaborately developed hind tarsi, I propose the name CALOTARSA for the new genus.

CALOTARSA, nov. gen.

Rather small, cinereous or blackish with yellow bands on abdomen, the latter thinly pilose. Eyes contiguous in ♂ for fully  $\frac{2}{3}$  distance from ocelli to base of antennæ, bare, extending on sides nearly to oval margin. Ocelli situated on vertex. Antennæ small, all three joints short, the

third but little longer than the second, rounded and laterally compressed but small, with a delicate, bare, terminal arista which is 2-jointed at extreme base. Face bare, wholly dark coloured, not prominent, neither carinate, tuberculate, nor hollowed, rather abbreviated below. Thorax narrower than head, with a few weak bristles posteriorly and on scutellum. Abdomen at base about as wide as thorax, narrowing posteriorly. Hypopygium prominent, curved under the abdomen. Wings (see fig. 4) longer than abdomen, spurious vein absent, third vein straight and not bent into first posterior cell, marginal cell wide open, anterior cross-vein far before middle of discal cell and rectangular, first posterior cell open, an apical cross-vein springing from fourth vein about as far beyond posterior cross-vein as length of latter, this apical cross-vein evenly bowed in and leaving the remaining section of fourth vein as a stump at its origin. While the apical cross vein greatly narrows the first

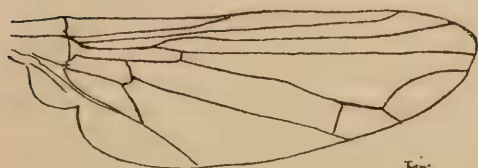


FIG 4.

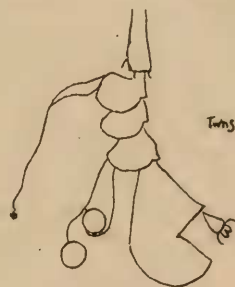


FIG 5.

posterior cell, this stump, or rather this last section of the fourth vein, proceeds on to the margin of the wing, thus forming an extra posterior cell. Posterior cross-vein nearer to margin of wing (on fifth vein) than  $\frac{1}{2}$  its length. Anterior and middle metatarsi about as long as remaining tarsal joints together. Hind metatarsi (see fig. 5) and two following joints equal, widened outwardly, thin and flattened, the metatarsus on its outer edge with a long slender cilium or petiole which is winged at its base; the third tarsal joint with a similar cilium, but not winged at base, bearing two round, thin and flattened chitinous tips or appendages, one at the end, the other on posterior border of cilium a little beyond middle and connected with base and inner extent of cilium by a clear thin membranous wing; fourth joint more elongate, its body or inner portion more thickened, but furnished outwardly with an enlarged thin and flattened wing which is strongly notched on its posterior inner border,

convexly curved on its outer border, and fully 3 times as long as the flattened joint preceding; fifth joint and claws normal.

*Calotarsa ornatipes*, nov. sp. ♂.

Eyes cinnamon-brown; face, anterior portion of front, cheeks, occiput, and oral region cinereous. Antennæ fulvous, arista brownish. Thorax cinereous, with four brownish vittæ. Scutellum cinereous. Abdomen light brownish, all of second, third and fourth segments except hind borders dark yellow, the yellow on fourth segment being more of a rufous, fifth segment and hypopygium nearly black; thin pile of abdomen yellowish on three anterior segments, darker posteriorly. Front and middle legs light fulvous, tarsi hardly darker. Hind legs fulvous, distal  $\frac{2}{3}$  of femora blackish, first three tarsal joints and body of fourth clothed with brassy hairs; the winged base of petiole on metatarsus light brownish; the chitinous tips or plates of petiole on third joint, wing of fourth joint, and whole of fifth nearly black. Claws and pulvilli a little elongate. Wings nearly hyaline, hardly tinged with tawny, the third costal cell pale yellowish. Halteres large, knobs brownish, stalks yellowish.

Length, hardly 6 mm.; of wing, 6 mm.

Described from a single ♂ specimen. Illinois.

#### BOOK NOTICES.

MONOGRAPHIE DES PHYCITINÆ ET DES GALLERIINÆ: PAR E. L. RAGONOT.

The first volume of M. Ragonot's long-expected Monograph of the Phycitinæ and Galleriinæ of the World has just appeared, and forms a quarto volume of 658 pages, besides 56 pages in the preface and introduction, and three plain and twenty coloured plates.

The first plate is devoted to structural details of the head, palpi and antennæ, while the next two plates represent the various forms of venation. The remaining twenty plates represent from twenty to twenty-five species each, with the body and wings of one side, while, in some cases, the underside of the wings of the other side is represented. Many structural details of the head, palpi and antennæ are also exhibited on these plates.

The figures are very accurately and beautifully drawn, and show a delicacy and softness rarely seen. An attempt has been made, for the first time, as M. Ragonot truly says, to represent the veins in the hind